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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/512,101

10/21/2004

Michael Rooke

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7590

09/26/2005

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EXAMINER

HOLLIDAY, JAIME MICHELE

ART UNIT

PAPER NUMBER

2686

DATE MAILED: 09/26/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b> 10/512,101	<b>Applicant(s)</b> ROOKE ET AL.	
	<b>Examiner</b> Jaime M. Holliday	<b>Art Unit</b> 2686	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

#### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) ☒ Responsive to communication(s) filed on 21 October 2004.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) ☒ Claim(s) 1-16 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-16 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 21 October 2004 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |   |   |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)  | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

## DETAILED ACTION

### *Information Disclosure Statement*

1. The information disclosure statement (IDS) submitted on October 21, 2004 has been considered by the Examiner and made of record in the application.
  
2. The drawings are objected to as failing to comply with 37 CFR 1.84(p)(4) because reference character "**24**" has been used to designate both "**message transfer**" and "**mobile station confirmation**". Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

### *Specification*

3. The disclosure is objected to because of the following informalities:

a) On **page 4 line 34**, replace "send" with --sent-- after "be" in order to correct a grammatical error; and

b) On **page 7 line 3**, replace "These both" with --Both of these-- after "device" in order to correct a grammatical error.

Appropriate correction is required.

### ***Claim Rejections - 35 USC § 101***

4. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

5. **Claims 9-11** are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

The language of the claim raises a question as to whether the claim is directed merely to an abstract idea that is not tied to a technological art, environment or machine which would result in a practical application producing a concrete, useful, and tangible result to form the basis of statutory subject matter under 35 U.S.C. 101.

**Claims 9-11**, claims the non-statutory subject matter of a program. Data structures not claimed as embodied in computer-readable media are descriptive material per se and are not statutory because they are not capable of causing functional change in the computer. See, e.g., Warmerdam, 33 F.3d at 1361, 31 USPQ2d at 1754 (claim to a data structure per se held nonstatutory). Therefore, since the claimed programs are not tangibly embodied in a physical medium, encoded on a computer-readable medium and

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clearly recited as a computer program then the Applicants has not complied with 35 U.S.C 101.

***Claim Rejections - 35 USC § 102***

6. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

7. **Claims 1, 2, 4, 5, 8 and 12-16** are rejected under 35 U.S.C. 102(b) as being anticipated by **Salin et al. (U.S. Patent # 6,370,390 B1)**.

Consider **claim 1**, Salin et al. clearly show and disclose a method for delivering short messages to mobile stations, reading on the claimed “method for delivering messages to a mobile terminal device.” Salin et al. further disclose a situation where a mobile station MS is attached to a GPRS network and a GSM network, and the short message service center (SM-SC) has received a short message (SM) for delivery to the mobile station, but the mobile station cannot be reached. The SM-SC first forwards the short message to the gateway mobile switching center for short message service (SMS-GMSC) which proceeds to request routing information for the short message from the home location register (HLR) of the mobile station, reading on the claimed “Method for delivering messages to a mobile terminal device in case of an unsuccessful message

delivery attempt to said mobile terminal device from a Store-and-Forward Entity (SFE) of a mobile communication network having a presence service, said presence service providing an information about the attainability of said mobile terminal device," (abstract, column 7 lines 60-65 and column 8 lines 8-16) characterized by:

    sending a Set Message Waiting Data message to the HLR of the MS in response to a failed delivery attempt (Failure Report) to the SMS-GMSC, reading on the claimed "receiving a notification about an unsuccessful delivery attempt of said message," (figure 2, column 8 lines 39-42 and 59-62) and

    acknowledging receipt of Set Message Waiting Data message from SMS-GMSC to HLR, reading on the claimed "and subscribing to said presence service for receipt of notifications about the attainability of said mobile terminal device," (figure 2, column 9 lines 1-4)

    sending alert message to SMS-GMSC, in response to mobile station updating its routing area to the serving node (SGSN) and the serving node sending this information to the HLR, reading on the claimed "checking availability information of said mobile terminal device in said presence service for an acceptance of said message by said mobile terminal device," (figure 2, column 9 lines 20-22, 30-32 and 35-37)

    forwarding short message to SMS-GSMC when SM-SC receives an alert message from the SMS-GMSC, reading on the claimed "initiating a

delivery attempt of said message to said mobile terminal device," (figure 2, column 9 lines 45-52)

the SMS-GMSC examines the address of the mobile station and request routing information from the HLR which returns an acknowledgment of the message with the current SGSN address and the MSC/VLR address of the mobile station, reading on the claimed "in accordance with the result of said checking, wherein said availability information for the acceptance of said messages by said mobile terminal device comprises information selected from a group of: type of message, size of the message, data content of the message, location of said mobile terminal device and willingness of a user of said mobile terminal device to receive a message" (figure 2, column 9 lines 53-64).

Consider **claim 2**, and **as applied claim 1 above**, Salin et al. further disclose SGSN sending information on the fact that the mobile station is again reachable to the HLR which sends an alert message to the SMS-GMSC. The SMS-GMSC then sends an alert message to the SM-SC, which then forwards the short message to the SMS-GMSC, reading on the claimed "receiving a status change notification message from said presence service about said mobile terminal device having a change of said availability information, starting a delivery attempt of said message to said mobile terminal device, in accordance with said received status change notification message" (column 9 lines 29-37).

Consider **claim 4**, and **as applied claim 1 above**, Salin et al. further disclose the SM-SC receives a short message for delivery to the mobile station,

reading on the claimed "receiving of said message to be transmitted to said mobile terminal device" (column 7 lines 63-65).

Consider **claim 5**, and **as applied claim 1 above**, Salin et al. further disclose the SGSN sending information on the fact that the mobile station is again reachable, to the HLR, in response to the mobile station sending the SGSN a message on its presence. Then SMS-GSMC receives an alert from the HLR, reading on the claimed "checking availability information of said mobile terminal device in said presence service for the availability of said mobile terminal device" (column 9 lines 30-37).

Consider **claim 8**, and **as applied claim 1 above**, Salin et al. further disclose the mobile station updating its routing area and sending a message on its presence to the SGSN, which proceeds to send this information to the HLR, reading on the claimed "availability information of said mobile terminal device in said presence service can arbitrarily be changed by receiving said presence service status change message from said mobile terminal device" (column 9 lines 21-32).

Consider **claim 12**, Salin et al. clearly show and disclose a SM-SC and SMS-GMSC connected to a GSM network, reading on the claimed "Store-and-Forward Entity connectable to a mobile communication network," wherein the SM-SC forwards a short message to the SMS-GMSC which examines the address of the mobile station and requests routing information for a short message from the HLR, reading on the claimed, "network having a presence



service for store-and-forwarding a message to a mobile terminal device,” (column 6 lines 19-23 and column 8 lines 8-15) characterized by:

returning a message on a failed delivery attempt from the SGSN to the SMS-GMSC, reading on the claimed “a component for receiving a notification about an unsuccessful delivery attempt of said message,” (column 8 line 39-42) and

sending a Set Message Waiting Data message to the HLR of the mobile station which includes a parameter indicating the mobile station could not be reached, reading on the claimed, “a component for subscribing to said presence service for receipt of notifications about the attainability status of said mobile terminal device,” (column 8 lines 59-65) wherein

HLR returns the current SGSN address and the MSC/VLR address of the mobile station, reading on the claimed “presence service provides an information about acceptance of said message selected from the group comprising: message type, message size, message content, sender type, sender, and location of said mobile terminal device” (column 8 lines 20-25).

Consider **claim 13**, and **as applied claim 12 above**, Salin et al. further disclose the HLR sending an alert message to the SMS-GMSC when it receives information that the mobile station is again reachable. The SMS-GMSC then sends an alert message to the SM-SC which proceeds to forwards the short message to the SMS-GMSC, reading on the claimed “a component for checking availability information of a presence service for an acceptance of said message

by said mobile phone, and a component to initiate a delivery attempt of said message to said mobile terminal device, in accordance with the operation of said checking component" (column 9 lines 32-37 and 45-51).

Consider **claim 14**, and **as applied claim 13 above**, Salin et al. further disclose the HLR sending an alert message to the SMS-GMSC when it receives information that the mobile station is again reachable, reading on the claimed "a component for checking availability information of said presence service for the availability of said mobile terminal device" (column 9 lines 32-37).

Consider **claim 15**, and **as applied claim 13 above**, Salin et al. further disclose the SM-SC receiving a short message for delivery to the mobile station, reading on the claimed "a component for receiving messages to be transmitted to said mobile terminal device" (column 7 lines 63-65).

Consider **claim 16**, and **as applied claim 12 above**, Salin et al. further disclose when the mobile station becomes reachable it sends a message on its presence to the SGSN that sends this information on to the HLR, reading on the claimed "a component to change said availability information in said presence service of said mobile terminal device according to the reception of a presence service status change message from said mobile terminal device" (column 9 lines 21-24 and 30-32).

***Claim Rejections - 35 USC § 103***

8. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

9. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

10. This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

11. **Claim 3** is rejected under 35 U.S.C. 103(a) as being unpatentable over **Salin et al. (U.S. Patent # 6,370,390 B1)** in view of **Carpenter (Pub# US 2005/0176409 A1)**.

Consider claim 3, and as applied to claim 1, Salin et al. show and disclose the claimed invention except that the message delivered is a multi media message.

In the same field of endeavor, Carpenter clearly shows and discloses a method for use in delivering a message. A Short Message Service (SMS) makes use of a SM-SC 128, which acts as a store-and-forward system for relaying short message. Messages are stored in the network until the destination device becomes available. The SM-SC may be integrated with an SMS-GMSC and an Interworking MSC for Short Message Service (SMS-IW MSC). An SMS-GMSC is a function for receiving a short message from an SM-SC, interrogating an HLR for routing information and SMS info, and delivering the short message for the recipient mobile station, reading on the claimed "method for delivering messages to a mobile terminal device from a Store-and-Forward Entity (SFE) of a mobile communication network having a presence service." Other messages which may be delivered are Multimedia Messaging Service (MMS) messages, reading on the claimed "message is a multi media message" (abstract and paragraph 32).

Therefore, it would have been obvious to a person of ordinary skill in the art at the time the invention was made to allow MMS messages to be sent as taught by Carpenter in the method of Salin et al. in order to permit subscribers to send a receive different types of messages.

12. **Claims 6 and 7** are rejected under 35 U.S.C. 103(a) as being unpatentable over **Salin et al. (U.S. Patent # 6,370,390 B1)** in view of **Rooke et al. (U.S. Patent 6,678,361)**.

Consider **claim 6**, and **as applied to claim 1 above**, Salin et al. clearly show and disclose the claimed invention except that the availability information is dependent on properties of the message.

In the same field of endeavor, Rooke et al. clearly show and disclose a method for delivering messages in a communication network consisting of at least one terminal and a messaging functionality, reading on the claimed "method for delivering messages to a mobile terminal device from a Store-and-Forward Entity (SFE) of a mobile communication network." A new multimedia message is received by the multimedia messaging service center (MMSC), which is able to decide which type of delivery has to be selected, based on the terminal capabilities and the current user profile stored in the MMSC, reading on the claimed "availability information for acceptance of said message is depending on properties of said message" (column 1 line 66- column 2 line 2 and column 3 lines 25-33).

Therefore, it would have been obvious to a person of ordinary skill in the art at the time the invention was made to allow the MMSC to the delivery of multimedia messages (column 4 lines 23-25) as taught by Rooke et al. in the method of Salin et al. in order to reduce signaling when short messages are sent (Salin et al.; column 5 lines 34-35).

Consider **claim 7**, and **as applied to claim 6 above**, Salin et al. clearly show and disclose the claimed invention except that the availability information is dependent on properties, such as message type, size, sender type of sender, of the message.

In the same field of endeavor, Rooke et al. clearly show and disclose the decision how to handle the submission of a multimedia message is based on the circumstance that content(s), size and type(s) of the multimedia message, the capabilities of the terminal, and the user profile of a subscriber related to the terminal are available to decision means, reading on the claimed "properties are selected from a group comprising: message type, message size, sender type, and sender" (column 3 lines 8-16).

Therefore, it would have been obvious to a person of ordinary skill in the art at the time the invention was made to allow the MMSC to use the size and type of message to decide on delivery of multimedia messages as taught by Rooke et al. in the method of Salin et al. in order to reduce signaling when short messages are sent (Salin et al.; column 5 lines 34-35).

### ***Conclusion***

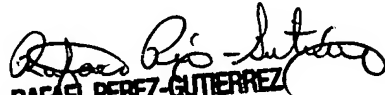
Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jaime M. Holliday whose telephone number is (571)

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272-8618. The examiner can normally be reached on Monday through Friday 7:30am to 4:00pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Marsha Banks-Harold can be reached on (571) 272-7905. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

  
RAFAEL PEREZ-GUTIERREZ  
PRIMARY EXAMINER  
9/17/05